

*Abstract*

Heat exchanger having a plurality of heat transfer tubes arranged substantially in the shape of a helicoidal tube with the individual coils running parallel to one another, and a plurality of fins secured to the external surfaces of the heat transfer tubes and arranged perpendicular to the tube to extend outwardly therefrom. The first working fluid flows inside  
5 the heat transfer tubes, and air flows through a passage defined between the adjacent fins and at right angles to the axis of each heat transfer tube. The blower is placed co-axial with the helicoid's axis to further enhance the heat exchange.